# STATEMENT OF GOVERNOR CHRISTINE TODD WHITMAN ADMINISTRATOR U.S. ENVIRONMENTAL PROTECTION AGENCY BEFORE THE SUBCOMMITTEE ON VA, HUD, AND INDEPENDENT AGENCIES OF THE COMMITTEE ON APPROPRIATIONS

# **NOVEMBER 28, 2001**

Madam Chair and Members of the Subcommittee, thank you for the opportunity to describe the Environmental Protection Agency's (EPA) role in combating bioterrorism: specifically, the role in the decontamination of anthrax in buildings as part of the Agency's overall mission to protect human health and the environment. I am pleased to say that EPA's efforts to meet its counterterrorism obligations are consistent with the President's statement that combating terrorism and protecting the nation's critical infrastructures are a high priority for his administration.

There are several Presidential Decision Directives (PDDs) that specify a role for EPA in counter terrorism activities. PDD 39 assigned EPA the task of assisting the FBI during crisis management in threat assessments and determining the type of hazards associated with releases or potential releases of materials in a terrorist incident. EPA, as the lead agency for Hazardous Materials Response under Emergency Support Function (ESF) 10 of the Federal Response Plan, is also assigned to assist the Federal Emergency Management Agency, during consequence management with environmental monitoring, decontamination, and long-term site cleanup. PDD 62 reinforces our mission to enhance the nation's capabilities to respond to terrorist events. PDD 63 which addresses the protection of America's critical infrastructure, named EPA the lead agency for the Water Supply Sector.

Under the provisions of PDD 62, signed by President Clinton in 1998, the EPA is assigned lead responsibility for cleaning up buildings and other sites contaminated by chemical or biological agents as a result of an act of terrorism. This responsibility draws on our decades of experience in cleaning up sites contaminated by toxins through prior practices or accidents.

Working with our federal partners, private sector experts, and drawing upon our considerable in-house expertise, EPA has been developing new methods and protocols, and standard operating procedures to deal with this new threat to the health and safety of the American people. And we have been doing so on a real-time basis. The speed of our response, however, has not been at the expense of sound science. Indeed, a team of science experts has been integral to our daily activities.

### EPA'S ROLE IN BUILDINGS CONTAMINATED WITH ANTHRAX

Our cleanup experts have been drawing on their years of expertise and experience, on the talents of scientists in industry and academia, and on the knowledge available from our federal partners. Similar analysis informed the cleanups undertaken at the several postal facilities and media offices, although since they were of a much smaller scope, they were more readily addressed.

Our role at a site generally begins after the Centers for Disease Control and Prevention (CDC) has tested to determine the presence of a threat and the risk that threat poses to human health. Once a decision is made to decontaminate a building, CDC also has the responsibility of defining: "How clean is clean?" They have the medical knowledge and expertise – as well as the responsibility under PDD 62 – to determine the levels to which a building must be cleaned before being judged safe for reoccupancy.

EPA staff has provided expert technical advice to facility managers throughout the country on issues such as sampling plans, worker safety and actual site cleanup methods.

This role is a natural fit for EPA's on-scene coordinators, managers who are experienced in assessing contamination in structures, soil, water and air-handling systems. On-scene coordinators have considerable experience at sorting out hazards, quantifying risks, planning and implementing emergency cleanups, and coordinating among other agencies, state and local government, and the private sector.

EPA employees are working at the direction of the incident commanders from other federal agencies, and report to the U.S. Postal Service and the Sergeant at Arms in the Capitol.

In addition to the activity generated by testing and cleaning, these sites are also being treated as crime scenes. That is why our Criminal Investigative Division has been working closely with the FBI and with local and state law enforcement agencies at the various contaminated sites. We are assisting the FBI in gathering evidence to identify the criminals responsible for terrorist attacks.

As we seek to apply the lessons we're learning from all our decontamination efforts one thing is becoming clear – there's no one size fits all solution. Each event has to be thoroughly analyzed as a separate case before we can propose an effective solution.

For example, cleaning a facility that largely contains rugged, heavy equipment can be accomplished using such methods as foam or liquid chlorine dioxide – methods that the contents of the building can stand up to. On the other hand, a facility that contains lots of paper, office furniture, and electronic equipment needs to be cleaned using another method – such as fumigation – that won't damage the contents in the way a liquid would.

Other factors, such as the amount of contamination found, the ways and extent to which it can be dispersed throughout a building, the nature of the surrounding area, and the ways in which the building is used all require additional consideration before proceeding with decontamination.

The first step in remediating a building is just like the first step in any cleanup operation and that is to determine the potential for risk to human health. Anthrax is a known threat to human health, but the literature is scant on the number of spores that a person must be exposed to before developing inhalational disease.

The health team that has come together to help us establish the parameters for defining the extent of contamination and providing direct health advice to affected individuals has involved a wide array of experts. The Congress's own Office of the Attending Physician has played a central role in providing direct medical advice to the people who work in the affected buildings. The CDC in the Department of Health and Human Services (in particular the National Institute for Occupational Safety and Health (NIOSH) within CDC) have provided world-class expertise. The Department of Defense, including the U.S. Army's CHPPM group has special expertise because of the potential that anthrax would be used as a biological weapon in a war setting. OSHA has been helpful in determining appropriate safety measures both for the people who work in the buildings and also for the extensive remediation crews that are at work here. The District of Columbia's Department of Health as well as their state counterparts, Maryland's Department of Health and Mental Hygiene, have been consulted regularly. And EPA's own in-

house expertise including toxicologists from as far away as our Denver office and safety officers from our own nearby Ft. Meade laboratory have also played a vital role.

Together this group of experts has reached consensus on when cleanup activities are warranted, and they have also formed a team to review final cleanup data to make a determination that the buildings will be safe to reoccupy.

# **REMEDIATION STRATEGIES**

While we have developed extraordinarily strong working relationships with numerous partners in developing the appropriate health and safety standards and in conducting our sampling work, it is in the area of actual remediation efforts that our collaborations have been the most broad-based.

The full array of federal agencies with expertise in remediation strategies has been involved in helping develop the tools we need to deal with anthrax contamination. These include, of course, the various components of the Department of Defense and a number of health agencies out of the Department of Health and Human Services. We have consulted with the White House's Office of Science Technology Policy. Indeed, the President's science advisor has been at the Incident Command Center, providing a key link to this federal government-wide response.

At EPA, our Office of Solid Waste and Emergency Response, the Office of Pesticides, our Emergency Response Team out of Edison, NJ, the Emergency Operations Center here in Washington, and the legion of responders from across the country led by our folks from Region III, have all played important roles in the cleanup effort.

A number of liquid and foam applications are effective at actually killing spores. Sandia Foam is a patented product, developed by the Sandia Labs, that we have been able to use on a number of surfaces. Similarly, chlorine dioxide in a liquid form, has been an extremely effective sporocide. We know these techniques work because we have used them in a number of areas. To address airborne

particles, HEPA (high efficiency particulate air) filter vacuums are able to capture particles down to less than one-half micron in size. After the remediation effort is complete, we have resampled these areas and they have come back clean.

The tools in our toolbox are growing rapidly. Each method, though, will have to prove its effectiveness before we add it to our Standard Operating Procedures. And that proof will come from confirmation samples that are taken after remediation is complete and come back demonstrating no threat to human health.

### EPA'S COUNTERTERRORISM INCIDENT RESPONSE ACTIVITIES

As EPA continues to strengthen its counter-terrorism (CT) program by building on the existing national response system for hazardous materials (hazmat) prevention, preparedness, and response, the Agency is involved in a variety of activities with federal, state, and local officials that include: responding to terrorism threats; pre-deploying for special events; planning, coordination, and outreach; and training and exercises. Most recently, EPA was asked to chair the Security and Safety of U.S. Facilities Group of the National Security Council's Policy Coordinating Committee for Counterterrorism and National Preparedness.

EPA established and maintains a National Incident Coordination Team (NICT) to assure full agency coordination of all emergency preparedness and response activities including counter terrorism. In the regions, the Agency's first responders are the On-Scene Coordinators (or OSCs). The OSCs have been actively involved with local, state, and federal authorities in preparing for and responding to threats of terrorism. EPA's OSCs, located throughout the United

States, have broad response authority and a proven record of success in responding rapidly to emergency situations.

### **REGISTRATION OF PRODUCTS**

Another principal responsibility of EPA's in anthrax decontamination is to ensure that the chemicals used to treat anthrax spores are efficacious and safe. EPA is responsible for registering pesticides, including these antimicrobial products used to treat anthrax spores, prior to their marketing in the U.S.

Before issuing a pesticide registration, the Agency reviews a significant body of data to determine whether use of that pesticide will result in unreasonable adverse effects to humans or the environment. These data can include information on short- and long-term toxic effects and examine the potential for exposure under expected application scenarios. For pesticides that have public health uses, such as those used on anthrax spores, EPA also critically evaluates their efficacy. Under emergency conditions, EPA may allow a new use of a previously registered pesticide or use of an unregistered pesticide where the Agency has sufficient data to make a safety finding. These decisions can often be made quickly, based on the data that EPA receives and reviews.

Responding to the anthrax contamination has presented some unique challenges to our pesticides program. For example, currently there are no registered pesticides approved for use against anthrax. Since the beginning of the anthrax-contamination events, EPA has been working hard to identify and evaluate existing pesticide products that are sporicidal, that is, those that kill spore-forming bacteria, even though such products may not have been tested on anthrax per se. Since October, the Agency has approved two pesticides for treating anthrax spores under emergency exemption provisions

of existing pesticide laws – the aqueous solution of chlorine dioxide and a foam used to treat anthraxcontaminated surfaces. We have identified several potential chemicals and new technologies which may
be effective against anthrax. The Agency continues to work closely with other federal agencies,
emergency response teams, and independent experts to develop effective remediation tools. On the
basis of site specific information, EPA recommends proper methods of decontamination including which
antimicrobial or other substances will be used. EPA has also established a hotline for venders who
believe they have products that could effectively treat anthrax and has begun daily briefings to establish
routine communication between on-site personnel and key centers within the Agency who oversee
and/or support them. EPA laboratories are assisting in testing samples from potentially contaminated
sites and the evaluation of antimicrobial products for effectiveness against anthrax has been made a top
priority. In addition, EPA is using its experience in this situation to develop approaches to handling
future biological and chemical exposures should they occur.

# **CONCLUSION**

September 11<sup>th</sup> has changed the world in which we live. EPA continues to rely on sound science and effective treatment techniques to address the threat of anthrax contamination in some of our nation's buildings. We are proud to be a part of a massive public-private effort to meet the challenges of this new world.

Thank you for the opportunity to appear before you today. I would be happy to answer any questions that you may have.